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RAW SEQUENCE LISTING
PATENT APPLICATION: US/08/452,843B

DATE: 07/19/2002 P.6
TIME: 14:25:46

Input Set : A:\2060_0010002 seqlist.txt
Output Set: N:\CRF3\07192002\H452843B.raw

3 <110> APPLICANT: Sette, Alessandro
4 Sidney, John
6 <120> TITLE OF INVENTION: HLA Binding Peptides and Their Uses
9 <130> FILE REFERENCE: 2060.0010002
11 <140> CURRENT APPLICATION NUMBER: US 08/452,843B
12 <141> CURRENT FILING DATE: 1995-05-30
14 <150> PRIOR APPLICATION NUMBER: US 08/344,824
15 <151> PRIOR FILING DATE: 1994-11-23
17 <150> PRIOR APPLICATION NUMBER: US 08/278,634
18 <151> PRIOR FILING DATE: 1994-07-21
20 <160> NUMBER OF SEQ ID NOS: 34
22 <170> SOFTWARE: FastSEQ for Windows Version 4.0
24 <210> SEQ ID NO: 1
25 <211> LENGTH: 9
26 <212> TYPE: PRT
27 <213> ORGANISM: Artificial Sequence
29 <220> FEATURE:
30 <223> OTHER INFORMATION: B35 consensus peptide
32 <400> SEQUENCE: 1
33 Phe Pro Phe Lys Tyr Ala Ala Ala Phe
34 1 5
36 <210> SEQ ID NO: 2
37 <211> LENGTH: 9
38 <212> TYPE: PRT
39 <213> ORGANISM: Artificial Sequence
41 <220> FEATURE:
42 <223> OTHER INFORMATION: Y1 analog of 1054.05
44 <400> SEQUENCE: 2
45 Tyr Pro Lys Val Lys Gln Trp Pro Leu
46 1 5
48 <210> SEQ ID NO: 3
49 <211> LENGTH: 11
50 <212> TYPE: PRT
51 <213> ORGANISM: Artificial Sequence
53 <220> FEATURE:
54 <223> OTHER INFORMATION: MAGE-1
58 <400> SEQUENCE: 3
59 Cys Ile Leu Glu Ser Cys Phe Arg Ala Val Ile
60 1 5 10
62 <210> SEQ ID NO: 4
63 <211> LENGTH: 9
64 <212> TYPE: PRT
65 <213> ORGANISM: Artificial Sequence

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67 <220> FEATURE:
68 <223> OTHER INFORMATION: B53 self peptide
70 <400> SEQUENCE: 4
71 Tyr Pro Ala Glu Ile Thr Leu Tyr Trp
72 1 5
74 <210> SEQ ID NO: 5
75 <211> LENGTH: 9
76 <212> TYPE: PRT
77 <213> ORGANISM: Artificial Sequence
79 <220> FEATURE:
80 <223> OTHER INFORMATION: Cw3 consensus
82 <400> SEQUENCE: 5
83 Phe Ala Met Pro Asn Phe Gln Thr Leu
84 1 5
86 <210> SEQ ID NO: 6
87 <211> LENGTH: 9
88 <212> TYPE: PRT
89 <213> ORGANISM: Artificial Sequence
91 <220> FEATURE:
92 <223> OTHER INFORMATION: Cw3 consensus
94 <400> SEQUENCE: 6
95 Phe Ala Met Pro Asn Phe Tyr Thr Leu
96 1 5
98 <210> SEQ ID NO: 7
99 <211> LENGTH: 9
100 <212> TYPE: PRT
101 <213> ORGANISM: Artificial Sequence
103 <220> FEATURE:
104 <223> OTHER INFORMATION: Cw4 consensus
106 <400> SEQUENCE: 7
107 Gln Pro Asp Asp Ala Val Tyr Lys Leu
108 1 5
110 <210> SEQ ID NO: 8
111 <211> LENGTH: 9
112 <212> TYPE: PRT
113 <213> ORGANISM: Artificial Sequence
115 <220> FEATURE:
116 <223> OTHER INFORMATION: Cw6 consensus
118 <400> SEQUENCE: 8
119 Ile Pro Tyr Pro Ile Val Arg Lys Leu
120 1 5
122 <210> SEQ ID NO: 9
123 <211> LENGTH: 9
124 <212> TYPE: PRT
125 <213> ORGANISM: Artificial Sequence
127 <220> FEATURE:
128 <223> OTHER INFORMATION: Cw6 consensus
130 <400> SEQUENCE: 9
131 Ile Pro Tyr Pro Ile Val Arg Ser Leu

RAW SEQUENCE LISTING
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132 1 5
134 <210> SEQ ID NO: 10
135 <211> LENGTH: 9
136 <212> TYPE: PRT
137 <213> ORGANISM: Artificial Sequence
139 <220> FEATURE:
140 <223> OTHER INFORMATION: Cw6 consensus
142 <400> SEQUENCE: 10
143 Ile Pro Phe Pro Ile Val Arg Tyr Leu
144 1 5
146 <210> SEQ ID NO: 11
147 <211> LENGTH: 9
148 <212> TYPE: PRT
149 <213> ORGANISM: Artificial Sequence
151 <220> FEATURE:
152 <223> OTHER INFORMATION: Histone H3.3
154 <400> SEQUENCE: 11
155 Arg Tyr Arg Pro Gly Thr Val Ala Leu
156 1 5
158 <210> SEQ ID NO: 12
159 <211> LENGTH: 9
160 <212> TYPE: PRT
161 <213> ORGANISM: Artificial Sequence
163 <220> FEATURE:
164 <223> OTHER INFORMATION: B7 Nat. Processed
166 <400> SEQUENCE: 12
167 Met Pro Arg Gly Val Val Thr Leu
168 1 5
170 <210> SEQ ID NO: 13
171 <211> LENGTH: 10
172 <212> TYPE: PRT
173 <213> ORGANISM: Artificial Sequence
175 <220> FEATURE:
176 <223> OTHER INFORMATION: p53, 26-35
178 <400> SEQUENCE: 13
179 Leu Pro Glu Asn Asn Val Leu Ser Pro Leu
180 1 5 10
182 <210> SEQ ID NO: 14
183 <211> LENGTH: 10
184 <212> TYPE: PRT
185 <213> ORGANISM: Artificial Sequence
187 <220> FEATURE:
188 <223> OTHER INFORMATION: p53, 84-93
190 <400> SEQUENCE: 14
191 Ala Pro Ala Pro Ala Pro Ser Trp Pro Leu
192 1 5 10
194 <210> SEQ ID NO: 15
195 <211> LENGTH: 11
196 <212> TYPE: PRT
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Input Set : A:\2060_0010002 seqlist.txt
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197 <213> ORGANISM: Artificial Sequence
199 <220> FEATURE:
200 <223> OTHER INFORMATION: p53, 127-137
202 <400> SEQUENCE: 15
203 Ser Pro Ala Leu Asn Lys Met Phe Cys Gln Leu
204 1 5 10
206 <210> SEQ ID NO: 16
207 <211> LENGTH: 9
208 <212> TYPE: PRT
209 <213> ORGANISM: Artificial Sequence
211 <220> FEATURE:
212 <223> OTHER INFORMATION: p53, 154-162
214 <400> SEQUENCE: 16
215 Gly Thr Arg Val Arg Ala Met Ala Ile
216 1 5
218 <210> SEQ ID NO: 17
219 <211> LENGTH: 9
220 <212> TYPE: PRT
221 <213> ORGANISM: Artificial Sequence
223 <220> FEATURE:
224 <223> OTHER INFORMATION: p53, 249-257
226 <400> SEQUENCE: 17
227 Arg Pro Ile Leu Thr Ile Ile Thr Leu
228 1 5
230 <210> SEQ ID NO: 18
231 <211> LENGTH: 10
232 <212> TYPE: PRT
233 <213> ORGANISM: Artificial Sequence
235 <220> FEATURE:
236 <223> OTHER INFORMATION: p53, 299-308
238 <400> SEQUENCE: 18
239 Leu Pro Pro Gly Ser Thr Lys Arg Ala Leu
240 1 5 10
242 <210> SEQ ID NO: 19
243 <211> LENGTH: 9
244 <212> TYPE: PRT
245 <213> ORGANISM: Artificial Sequence
247 <220> FEATURE:
248 <223> OTHER INFORMATION: p53, 315-323
250 <400> SEQUENCE: 19
251 Ser Pro Gln Pro Lys Lys Lys Pro Leu
252 1 5
254 <210> SEQ ID NO: 20
255 <211> LENGTH: 10
256 <212> TYPE: PRT
257 <213> ORGANISM: Artificial Sequence
259 <220> FEATURE:
260 <223> OTHER INFORMATION: p53, 321-330
262 <400> SEQUENCE: 20

RAW SEQUENCE LISTING
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Input Set : A:\2060_0010002 seqlist.txt
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263 Lys Pro Leu Asp Gly Glu Tyr Phe Thr Leu
264 1 5 10
266 <210> SEQ ID NO: 21
267 <211> LENGTH: 9
268 <212> TYPE: PRT
269 <213> ORGANISM: Artificial Sequence
271 <220> FEATURE:
272 <223> OTHER INFORMATION: p53, 361-369
274 <400> SEQUENCE: 21
275 Gly Ser Arg Ala His Ser Ser His Leu
276 1 5
278 <210> SEQ ID NO: 22
279 <211> LENGTH: 13
280 <212> TYPE: PRT
281 <213> ORGANISM: Artificial Sequence
283 <220> FEATURE:
284 <223> OTHER INFORMATION: B7-like-supermotifs
W--> 286 <221> NAME/KEY: VARIANT
287 <222> LOCATION: (1)...(1)
288 <223> OTHER INFORMATION: Xaa=any of the amino acids found in Table 1, as
289 well as, non-naturally occurring amino acids or
290 amino acid mimetic
W--> 292 <221> VARIANT
293 <222> LOCATION: (3)...(8)
294 <223> OTHER INFORMATION: Xaa=any of the amino acids found in Table 1, as
295 well as, non-naturally occurring amino acids or
296 amino acid mimetics
W--> 298 <400> 22
W--> 299 Xaa Pro Xaa Xaa Xaa Xaa Xaa Ala Val Ile Leu Met
300 1 5 10
302 <210> SEQ ID NO: 23
303 <211> LENGTH: 14
304 <212> TYPE: PRT
305 <213> ORGANISM: Artificial Sequence
307 <220> FEATURE:
308 <223> OTHER INFORMATION: B7-like-supermotifs
W--> 310 <221> NAME/KEY: VARIANT
311 <222> LOCATION: (1)...(1)
312 <223> OTHER INFORMATION: Xaa=any of the amino acids found in Table 1, as
313 well as, non-naturally occurring amino acids or
314 amino acid mimetic
W--> 316 <221> VARIANT
317 <222> LOCATION: (3)...(9)
318 <223> OTHER INFORMATION: Xaa=any of the amino acids found in Table 1, as
319 well as, non-naturally occurring amino acids or
320 amino acid mimetics
W--> 322 <400> 23
W--> 323 Xaa Pro Xaa Xaa Xaa Xaa Xaa Xaa Ala Val Ile Leu Met
324 1 5 10

```

RAW SEQUENCE LISTING ERROR SUMMARY
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Input Set : A:\2060_0010002 seqlist.txt
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Please Note:

Use of n and/or Xaa have been detected in the Sequence Listing. Please review the Sequence Listing to ensure that a corresponding explanation is presented in the <220> to <223> fields of each sequence which presents at least one n or Xaa.

Seq#:22; Xaa Pos. 1,3,4,5,6,7,8
Seq#:23; Xaa Pos. 1,3,4,5,6,7,8,9
Seq#:24; Xaa Pos. 1,3,4,5,6,7,8
Seq#:25; Xaa Pos. 1,3,4,5,6,7,8,9
Seq#:26; Xaa Pos. 1,3,4,5,6,7,8
Seq#:27; Xaa Pos. 1,3,4,5,6,7,8
Seq#:28; Xaa Pos. 1,3,4,5,6,7,8
Seq#:29; Xaa Pos. 1,3,4,5,6,7,8
Seq#:30; Xaa Pos. 1,3,4,5,6,7,8
Seq#:31; Xaa Pos. 1,3,4,5,6,7,8
Seq#:32; Xaa Pos. 1,3,4,5,6,7,8,9
Seq#:33; Xaa Pos. 1,3,4,5,6,7,8,9,10
Seq#:34; Xaa Pos. 1,3,4,5,6,7,8,9,10,11

VERIFICATION SUMMARY

PATENT APPLICATION: US/08/452,843B

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Input Set : A:\2060_0010002 seqlist.txt
Output Set: N:\CRF3\07192002\H452843B.raw

L:286 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:292 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:22
L:298 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:22
L:299 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:22 after pos.:0
L:310 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:316 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:23
L:322 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:23
L:323 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:23 after pos.:0
L:334 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:340 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:24
L:346 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:24
L:347 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:24 after pos.:0
L:358 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:364 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:25
L:370 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:25
L:371 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:25 after pos.:0
L:382 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:388 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:26
L:394 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:26
L:395 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:26 after pos.:0
L:406 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:412 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:27
L:418 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:27
L:419 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:27 after pos.:0
L:430 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:436 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:28
L:442 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:28
L:443 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:28 after pos.:0
L:454 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:460 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:29
L:466 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:29
L:467 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:29 after pos.:0
L:478 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:484 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:30
L:490 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:30
L:491 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:30 after pos.:0
L:502 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:508 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:31
L:514 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:31
L:518 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:31
L:519 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:31 after pos.:0
L:531 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:537 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:32
L:543 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:32
L:547 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:32
L:548 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:32 after pos.:0
L:560 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:566 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:33

VERIFICATION SUMMARY

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L:572 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:33
L:576 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:33
L:577 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:33 after pos.:0
L:589 M:281 W: Numeric Fields not Ordered, <221> Sort in ascending order!
L:595 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:34
L:601 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:34
L:605 M:258 W: Mandatory Feature missing, <220> not found for SEQ ID#:34
L:606 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:34 after pos.:0